

Fraction/Decimal/Percent Conversions

Note: please talk to your instructor for other conversions

Changing fractions to decimals: divide the bottom number into the top number

$$\frac{1}{2} = 2 \overline{)1}^{\cdot 5} = .5 \quad 8\frac{1}{5} \Rightarrow 5 \overline{)1}^{\cdot 2} = 8.2$$

Changing decimals to fractions: place a one under the point and a zero under the digits

$$.7 = \frac{.7}{10} = \frac{7}{10} \quad 3.73 = 3 \frac{.73}{100} = 3 \frac{73}{100} \quad 2.6 = 2 \frac{.6}{10} = 2 \frac{6}{10} = 2 \frac{3}{5}$$

Changing Decimals to Percents: move decimal point two places to right (add zeros)

$$\begin{array}{ccccccc} \overbrace{.27}^{\curvearrowright} = 27.\% & \overbrace{1.4}^{\curvearrowright} = 140.\% & \overbrace{7}^{\curvearrowright} = 700.\% & \overbrace{.005}^{\curvearrowright} = .5\% \end{array}$$

Changing Percents to Decimals: move the decimal point two places to the left (add zeros)

$$\begin{array}{ccccccc} \overbrace{30\%}^{\curvearrowright} = .30 & \overbrace{.57\%}^{\curvearrowright} = .0057 & \overbrace{8\frac{1}{5}\%}^{\curvearrowright} \Rightarrow 5 \overline{)1}^{\cdot 2} = 8.2\% = .082 \end{array}$$

Note: place a decimal point even if you don't see one

Practice

Read and follow all directions

Directions: Fill in the blanks in the following table. **Reduce fractions to lowest terms. Round decimals to hundredths. Round percents to hundredths.**

Mixed number or fraction	Decimal Number	Percent
$\frac{1}{2}$		
	.336	
		72%
$\frac{3}{5}$		
		$\frac{1}{2}\%$
	1.23	
$\frac{7}{8}$		
		$3\frac{1}{4}\%$
	426.2	
$8\frac{2}{3}$		
	.01	
$5\frac{7}{8}$		

Answers to Practice

Mixed number or fraction	Decimal Number	Percent
$\frac{1}{2}$.50	50.00%
$\frac{42}{125}$.336	33.60%
$\frac{18}{25}$	0.72	72.00%
$\frac{3}{5}$	0.60	60.00%
$\frac{1}{100}$	0.01	$\frac{1}{2}\%$
$1\frac{23}{100}$	1.23	123.00%
$\frac{7}{8}$	0.88	88%
$\frac{3}{100}$	0.03	$3\frac{1}{4}\%$
$426\frac{1}{5}$	426.2	42,620.00%
$8\frac{2}{3}$	8.67	867%
$\frac{1}{100}$	0.01	1%
$5\frac{7}{8}$	5.88	588%